The Pump Handle The Pump Handle

"I had an interview with the Board of Guardians of St. James's parish, on the evening of Thursday, 7th September, and represented the above circumstances to them. In consequence of what I said, the handle of the pump was removed on the following day."

John Snow, 1855

November 2005 Topics

- Influenza Update
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Influenza Update

On Oct. 11, 2005, the first laboratory-identified human influenza case of the 2005/2006 influenza season was reported to the North Dakota Department of Health (NDDoH). As of November 29, a total of five human laboratory-identified influenza infections had been reported to the NDDoH from Cass, Golden Valley and Grand Forks counties. At this time last year, in comparison, 18 human influenza cases had been reported to the NDDoH.

The NDDoH is encouraging influenza specimen submission for viral isolation in order to identify what type and strain is circulating in the community. If a patient tests positive via a rapid test, call the NDDoH at 800.472.2180 for consultation. (Free testing will be provided until influenza has been characterized in your community.)

Influenza vaccine availability may vary around the state. People are encouraged to contact their health-care provider or local public health unit to see if vaccine is being offered and what groups are being vaccinated. The NDDoH is recommending that all people at risk for serious complications from influenza be vaccinated. People who possibly can spread the disease to those at high risk, such as health-care workers, out-of-home caregivers and household contacts, also should be vaccinated. Healthy people ages five to 49 years can get protection from the flu by vaccination with FluMist.

For more information about influenza and the surveillance program, visit the NDDoH website at www.ndflu.com.



Planning For Pandemic Influenza

A draft of the North Dakota Department of Health pandemic influenza plan is available at www.cste.org/specialprojects/Influenzaplans/StateMap.asp. Click the state of North Dakota to view the state plan. This plan has been incorporated into an "all hazards" public health emergency response plan. Aside from the state plan, regional emergency preparedness and response coordinators and local public health units also are working on protocols and procedures for responding to pandemic influenza and other public health events. These plans are practiced and evaluated at the state and local level using table-top exercises and other trainings.

Avian influenza in birds is spreading in Asia and Europe. A strain of avian flu, H5N1, has shown to be particularly pathogenic to affected birds. Since 1997, more than 130 human cases have been diagnosed with the H5N1 strain in Thailand, Vietnam, Cambodia and Indonesia. Of those cases, more than half have died. Currently, close contact with infected poultry has been the primary source for human infection. There is no evidence to suggest the H5N1 strain has the ability to be transmitted from human to human, although this phenomenon remains unknown. Because of concerns about the potential for more widespread infection in the human population, pandemic influenza plans are being developed to help prepare for such an event.

For more information about the avian H5N1 virus and pandemic influenza, visit pandemicflu.gov/general/ and www.who.int/csr/disease/avian_influenza/en/.



Exclusion Criteria For Prevention of Seasonal Disease Outbreaks

Seasonal illnesses such as the common cold, influenza, respiratory syncytial virus (RSV), strep throat and viral gastroenteritis may increase during the colder months. Occurrence of acute diarrheal infections may occur both in the winter and summer. Good hand washing and personal hygiene are essential practices to prevent any disease. However, some infections require additional steps to prevent secondary transmission and outbreaks from occurring. People working in health-care facilities, educational institutions, daycares and food establishments should be aware of exclusion criteria for particular infections

Common cold

- Children without fever who have mild common cold symptoms such as sore throat, croup, bronchitis, rhinitis (runny nose) or otitis media (ear infection) should not be denied admission to child care unless their illness is characterized by one or more of the following conditions:
 - a) The illness limits the child's participation in activities.
 - b) The illness results in the need of more care than the staff can provide without compromising the health and safety of other children.

Influenza

- All children age s6 to 23 months, care providers of children age birth to 23 months in the child care setting, all health-care personnel and people older than 2 who have high risk medical conditions should be immunized for influenza annually.
- Parents of sick children are encouraged to keep the children home and away from the child-care setting until the children have been without fever for 24 hours. Similarly, sick health-care and child-care providers are encouraged to stay home, as well.

Respiratory syncytial virus (RSV)

- RSV infections usually occur during the late fall, winter or early spring months.
- Exclude children from child care until fever is gone and the child is well enough to participate in routine activities.
- In a hospital setting, RSV transmission can be prevented by strict attention to contact precautions, such as hand washing and wearing gowns and gloves. Patients with RSV infection should be cared for in single rooms or placed in a cohort.

Strep throat

- Caused by Group A streptococci, can occur year round but peak in colder seasons.
- People with sore throats should be seen by a doctor who can perform tests to find out whether the illness is strep throat.
- If the test result shows strep throat, the person should stay home from work, school or day care until 24 hours after taking an antibiotic.

Viral gastroenteritis

- Caused by many different viruses, most commonly by norovirus (formally known as Norwalk-like virus) and rotavirus.
- Ill health-care and child-care staff and food handlers should be excluded until vomiting and diarrhea stops. Vomiting is defined as two or more episodes in the previous 24 hours. Diarrhea is defined as an increased number of stools compared with a person's normal pattern, along with decrease stool form and/or watery, blood- or mucous-containing stools.
- Children should be excluded from day care or school until vomiting stops.
- The general recommendation for children with infectious diarrhea is to stay home until diarrhea stops. If not possible, cohorting children with diarrhea may be considered. Enhance hygiene and sanitation practices while illness is present in the facility.
- In a health-care setting, patients suspected of viral gastroenteritis may be placed in private rooms or placed in a cohort.
- Food handlers should avoid job duties involving direct contact with ready-to-eat foods and food contact utensils until three days after symptoms subside.
 Maintaining strict personal hygiene at all times is required.

Acute diarrhea

- Ill health-care and child-care staff and food handlers should be excluded until diarrhea stops.
- The general recommendation for children with infectious diarrhea is to stay home until diarrhea stops. If not possible, cohorting children with diarrhea may be

- considered. Enhance hygiene and sanitation practices while illness is present in the facility.
- For shiga-toxin producing *E.coli*, including *E.coli* O157:H7, *Salmonella* and *Shigella* infections, child care staff and children, health-care workers and food handlers should be excluded until asymptomatic and two consecutive negative stool specimens are collected 24 hours apart and 48 hours after completion of antibiotics. For *Salmonella typhi*, three negative cultures are required. Click here for exclusion criteria on more enteric infections.

Resource: American Academy of Pediatrics. In: Pickering LK, ed. *Red Book: 2003 Report of the Committee on Infectious Diseases.* 26th ed. Elk Grove Village, IL: American Academy of Pediatrics; 2003:[126-128].



Revised ACIP Recommendations: Hepatitis B, Hepatitis A and Tdap Vaccines

The Advisory Committee on Immunization Practices (ACIP) passed revised recommendations for **hepatitis B vaccination of adults**. The following draft recommendations for hepatitis B vaccine are:

- Hepatitis B vaccine should be offered to all adults in selected settings; e.g. STD clinics, drug abuse treatment facilities, HIV testing sites and correctional facilities.
- Hepatitis B vaccine is recommended for all unvaccinated adults at high risk for hepatitis B infection and all adults seeking protection from hepatitis B infection.

ACIP recommendations for **childhood hepatitis A vaccination** also are revised. The minimum age for the use of VAQTA[®] and HAVRIX[®], hepatitis A vaccines, has been reduced to 12 months of age. The minimum age was previously 2 years of age. The following childhood hepatitis A immunization recommendations were made:

All children ages 12 months through 35 months should receive hepatitis A vaccine.
 Children who are not vaccinated at this time should receive hepatitis A vaccine during the preschool years.

Recommendations for the use of **Tdap in adults** also were revised. All adults should receive Tdap instead of Td. The draft recommendations are as follows:

- Adults who received their last dose of Td more than 10 years earlier should receive a single dose of Tdap to replace a single dose of Td for booster immunization against tetanus, diphtheria and pertussis.
- Intervals shorter than 10 years since the last Td may be used to protect against pertussis.
- Adults who have or who anticipate having close contact with an infant younger than 12 months should receive a single dose of Tdap to protect against pertussis.
- Women should receive a dose of Tdap as soon as possible in the immediate postpartum period if they have not previously received Tdap. When possible, women should receive Tdap prior to conception.
- Tetanus vaccination is indicated routinely for pregnant women. Tdap is preferred to Td if it has been 10 years or more since the last Td.

Currently, only one Tdap vaccine is approved for use in adults. ADACELTM, from sanofi pasteur, is approved for use in people ages 11 to 64. BOOSTRIX[®], from GlaxoSmithKline, is approved for use only in adolescents ages 10 to 18.

For more information about revised ACIP recommendations, visit www.cdc.gov/nip/ACIP/default.htm. Please contact the North Dakota Immunization Program with any questions at 701.328.3386 or toll-free at 800.472.2180.

Contributing authors of The Pump Handle include Molly Sander, Michelle Feist, Julie Goplin, Tracy Miller and Kirby Kruger. For questions, suggestions or inquiries, or to be removed from the mailing list, please contact Julie Goplin of the Division of Disease Control at 701.238.2375 or by email at jgoplin@state.nd.us.

The pump handle picture in the title was obtained from the website www.ph.ucla.edu/epi/snow.html.



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